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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/551,509	04/17/2000	Yoshiyuki Namizuka	0557-4964-2	1654
22850	7590 09/13/2004		EXAM	INER
OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			LAMB, TWYLER MARIE	
			ART UNIT	PAPER NUMBER
			2622	

DATE MAILED: 09/13/2004

Please find below and/or attached an Office communication concerning this application or proceeding.



# **UNITED STATES DEPARTMENT OF COMMERCE U.S. Patent and Trademark Office**

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09/551,509	4/17/2000	Yoshiyuk;	Namizuka	0557-4964-2	
				EXAMINER	
			LK	LAMB T.	
			ART UNIT	PAPER	
			2022	15	

Please find below and/or attached an Office communication concerning this application or proceeding.

**Commissioner for Patents** 

The action received by the applicant had incorrect entries. Due to this the applicant is being issued a corrected action and a new start date.

TWYLER LAMB PRIMARY EXAMINER

	Application No.	Applicant(s)						
	09/551,509	NAMIZUKA ET AL.						
Office Action Summary	Examiner	Art Unit						
	Twyler M. Lamb	2622						
The MAILING DATE of this communication app Period for Reply	The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply							
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  - Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).								
Status	2-1-1	·						
	Responsive to communication(s) filed on <u>02 October 2003</u> .							
<i>,</i> —	action is non-final.							
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.								
Disposition of Claims								
4) Claim(s) 1-24 is/are pending in the application	<b>).</b>							
4a) Of the above claim(s) is/are withdra	4a) Of the above claim(s) is/are withdrawn from consideration.							
5) Claim(s) is/are allowed.	Claim(s) is/are allowed.							
6)⊠ Claim(s) <u>1-24</u> is/are rejected.								
7) Claim(s) is/are objected to.								
8) Claim(s) are subject to restriction and/o	8) Claim(s) are subject to restriction and/or election requirement.							
Application Papers								
9) The specification is objected to by the Examine								
10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.								
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).							
	Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).							
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.								
Priority under 35 U.S.C. §§ 119 and 120								
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  a) All b) Some * c) None of:  1. Certified copies of the priority documents have been received.  2. Certified copies of the priority documents have been received in Application No.  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.  13) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet.  37 CFR 1.78.  a) The translation of the foreign language provisional application has been received.  14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.								
Attachment(s)								
1. Notice of References Cited (PTO-892) 2) \( \bigcup \) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s)	5) 🔲 Notice of Informal P	(PTO-413) Paper No(s) atent Application (PTO-152)						

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#### **DETAILED ACTION**

#### Notice to Applicant (s)

 This action is a supplemental action to correct the problems cited by the applicant in the previous actions. Due to errors in the previous actions a new start time is granted.

Claims 1-24 are pending.

#### **Priority**

2. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

## Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 4. Claims 1-2, 4, 7-9, 11, 14-17, 19 and 22-24 are rejected under 35 U.S.C. 102(e) as being anticipated by Suzuki et al. (Suzuki) (US 6,480,297).

With regard to claim 1, Suzuki discloses an image-processing apparatus (Figure 1) comprising: at least one of a at least one of a image reading unit (image reading

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means 11) which reads an image data (first image data) (col 5, lines 51-53), an image memory control unit (image memory control means 15) which writes/reads the image data (second image data) by controlling a memory (image memory 16) (col 6, lines 7-10), an image processing unit (See Figure 2 steps A5, A10) which processes the image data to obtain a third image data (col 8, lines 50-55), and an image writing unit (image forming means 18) which prints an image corresponding to the image data on a paper (col 5, lines 47-49); and an image data control unit (control unit 23) which receives at least one of the first image data, the second image data, and the third image data, and transmits received image data to said image writing unit (image forming means 18) (col 8, lines 22-29).

With regard to claim 2, Suzuki also discloses said image processing is realized with a processor and a program of this processor is changeable (which reads on application button and program button being on the display section, from this it is clear the programs can be changed) (col 25, lines 26-35).

With regard to claim 4, Suzuki also discloses further comprising, a first processor which controls any of said image reading unit, said image processing unit, and said image writing unit through a first bus (col 8, line 39 – col 9, line 43): and a second processor which controls said image memory control unit through a second bus (col 8, lines 39-55; col 9, line 44 – col 10, line 41), wherein said image data control unit (control unit 440) controls the interface between said first bus and said second bus (col 8, lines 39-55).

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With regard to claim 7, Suzuki discloses an image-processing apparatus (Figure 1) comprising: at least one of a image reading unit (image reading means 11) which reads a first image data (col 5, lines 51-53), an image memory control unit (image memory control means 15) which writes/reads a second image data by controlling a memory (image memory 16) (col 6, lines 7-10), an image processing unit (See Figure 2 steps A5, A10) which processes the image data to obtain a third image data (col 8, lines 50-55), and an image writing unit (image forming means 18) which prints an image corresponding to the image data on a paper (col 5, lines 47-49); and an image data control unit (control unit 23) which receives at least one of the first image data, the second image data, and stores the received image data into a memory, and transmits received image data to said image writing unit (image forming means 18) (col 8, lines 22-29), wherein said image memory control unit is commonly used by a plurality of applications including at least one of a facsimile application, a scanner application, a

With regard to claim 8, Suzuki also discloses said image memory control unit (image memory control means 15) has been connected through said image data control unit (control unit 23) to any of said image reading unit, said image processing unit, and said image writing unit, and wherein said image data control unit transmits the image data to or receives the image data from said image memory control unit and anyone of said image reading unit, said image processing unit, and said image writing unit (image forming means 18) (col 8, lines 23-38).

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With regard to claim 9, Suzuki also discloses said image processing is realized with a processor and the program of this processor is changeable (which reads on application button and program button being on the display section, from this it is clear the programs can be changed) (col 25, lines 26-35).

With regard to claim 11, Suzuki also discloses further comprising, a first processor which controls any of said image reading unit, said image processing unit, and said image writing unit through a first bus (col 8, line 39 – col 9, line 43): and a second processor which controls said image memory control unit through a second bus (col 8, lines 39-55; col 9, line 44 – col 10, line 41), wherein said image data control unit (control unit 440) controls the interface between said first bus and said second bus (col 8, lines 39-55).

With regard to claim 14, Suzuki discloses an image-processing apparatus (Figure 1) comprising: at least one of a image reading unit (image reading means 11) which reads a first image data (col 5, lines 51-53), an image memory control unit (image memory control means 15) which writes/reads a second image data by controlling a memory (image memory 16) (col 6, lines 7-10), and an image writing unit (image forming means 18) which prints an image corresponding to the second image data on a paper (col 5, lines 47-49); and an image processing unit (See Figure 2 steps A5, A10) which receives at least one of the first image data and the second image data, processes the received image data (col 8, lines 50-55); and transmits received image data to said image writing unit (image forming means 18) (col 8, lines 22-29), wherein said image memory control unit is commonly used by a plurality of applications including

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at least one of a facsimile application, a scanner application, a printer application, and a copier application (col 6, lines 36-61).

With regard to claim 15, Suzuki also discloses said image processing unit (See Figure 2 steps A5, A10) is connected through said image data control unit (control unit 23) to any of said image reading unit, said image memory control unit, and said image writing unit, and wherein said image data control unit transmits at least one of the first image data and second image data to or receives the processed image data from said image processing unit, and said image data control unit transmits at least on e of the first image data, second image data and processed image data stored in the memory to anyone of said image memory control unit and said image writing unit (image forming means 18), and said image data control unit receives at least one of the first image data, second image data, and processed image data stored in the memory from at least one of said image reading unit and said image memory control unit (col 8, lines 22-38).

With regard to claim 16, Suzuki also discloses said image processing unit comprises a correcting unit which corrects the deterioration of the information of the first image data; and an image quality processing unit which processes the image quality of the image data corrected by said correcting unit or the second image data in accordance with the image formation characteristic (col 25, line 37 – col 27, line 18).

With regard to claim 17, Suzuki also discloses said image processing is realized with a processor and the program of this processor is changeable (which reads on application button and program button being on the display section, from this it is clear the programs can be changed) (col 25, lines 26-35).

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With regard to claim 19, Suzuki also discloses further comprising, a first processor which controls any of said image reading unit, said image processing unit, and said image writing unit through a first bus (col 8, line 39 – col 9, line 43): and a second processor which controls said image memory control unit through a second bus (col 8, lines 39-55; col 9, line 44 – col 10, line 41), wherein said image data control unit (control unit 440) controls the interface between said first bus and said second bus (col 8, lines 39-55).

The limitations for claims 22-24 are addressed in the rejections above.

## Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 3, 10 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Suzuki et al. (Suzuki) (US 6,480,297) in view of Iwase et al. (Iwase) (US 6,188,803).

With regard to claim 3, Suzuki differs from claim 3, in that he does not teach said image processing is realized with an SIMD (Signal Instruction Multiple Data stream) processor.

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lwase discloses an image processing device that includes image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor (col 12, lines 39-43; col 12, lines 50-58).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor as taught by Iwase. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching of Iwase so that the processors can be arranged in parallel and can be controlled together in accordance with a single program contained in the program controller as taught by Iwase in col 12, lines 50-58.

With regard to claim 10, Suzuki differs from claim 10, in that he does not teach said image processing is realized with an SIMD (Signal Instruction Multiple Data stream) processor.

lwase discloses an image processing device that includes image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor (col 12, lines 39-43; col 12, lines 50-58).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor as taught by Iwase. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching of Iwase so that the processors can be arranged

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in parallel and can be controlled together in accordance with a single program contained in the program controller as taught by Iwase in col 12, lines 50-58.

With regard to claim 18, Suzuki differs from claim 18, in that he does not teach said image processing is realized with an SIMD (Signal Instruction Multiple Data stream) processor.

Iwase discloses an image processing device that includes image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor (col 12, lines 39-43; col 12, lines 50-58).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include image processing being realized with an SIMD (Signal Instruction Multiple Data stream) processor as taught by Iwase. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching of Iwase so that the processors can be arranged in parallel and can be controlled together in accordance with a single program contained in the program controller as taught by Iwase in col 12, lines 50-58.

3. Claims 5-6, 12-13 and 20-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Suzuki et al. (Suzuki) (US 6,480,297) in view of Nakajima et al. (Nakajima) (US 5,650,861).

With regard to claim 5, Suzuki differs from claim 5 in that he does not teach further comprises a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile

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control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) connected to any of said image memory control unit and said image data control unit through said second bus (bus 2030) (col 26, lines 18-26), which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit (col 26, lines 29-62).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit as taught by Nakajima. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

With regard to claim 6, Suzuki as modified also discloses said image reading unit (image reading means 11), said image data control unit (control unit 23), said image memory control unit (image memory control means 15), said image processing unit (See Figure 2 steps A5, A10), said image writing unit (image forming means 18) are configured as independent units (col 6, lines 36-61).

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Suzuki differs from claim 6 in that he does not teach facsimile control unit configured as an independent unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) configured as an independent unit (col 26, lines 18-26).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit configured as an independent unit as taught by Nakajima. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

With regard to claim 12, Suzuki differs from claim 12 in that he does not teach further comprises a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) connected to any of said image memory control unit and said image data control unit through said second bus (bus 2030) (col 26, lines 18-26), which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit (col 26, lines 29-62).

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Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit as taught by Nakajima. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

With regard to claim 13, Suzuki as modified also discloses said image reading unit (image reading means 11), said image data control unit (control unit 23), said image memory control unit (image memory control means 15), said image processing unit (See Figure 2 steps A5, A10), said image writing unit (image forming means 18) are configured as independent units (col 6, lines 36-61).

With regard to claim 13, Suzuki differs from claim 13 in that he does not teach facsimile control unit configured as an independent unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) configured as an independent unit (col 26, lines 18-26).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit configured as an independent unit as taught by Nakajima. It would have been obvious

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to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

With regard to claim 20, Suzuki differs from claim 20 in that he does not teach further comprises a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) connected to any of said image memory control unit and said image data control unit through said second bus (bus 2030) (col 26, lines 18-26), which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit (col 26, lines 29-62).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit connected to any of said image memory control unit and said image data control unit through said second bus, which facsimile control unit transmits or receives a facsimile image from or to any of said image memory control unit and said image data control unit as taught by Nakajima. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

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With regard to claim 21, Suzuki as modified also discloses said image reading unit (image reading means 11), said image data control unit (control unit 23), said image memory control unit (image memory control means 15), said image processing unit (See Figure 2 steps A5, A10), said image writing unit (image forming means 18) are configured as independent units (col 6, lines 36-61).

Suzuki differs from claim 21 in that he does not teach facsimile control unit configured as an independent unit.

Nakajima discloses an image processing apparatus that includes comprising a facsimile control unit (CPU 2002) configured as an independent unit (col 26, lines 18-26).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki to include comprising a facsimile control unit configured as an independent unit as taught by Nakajima. It would have been obvious to one of ordinary skill in the art at the time of the invention to have modified Suzuki by the teaching Nakajima to add the capability of faxing to the functions the apparatus is capable of performing as taught in Nakajima in col 26, lines 46-61.

#### Response to Arguments

Applicant's arguments with respect to claims 1-24 have been considered but are 4. moot in view of the new ground(s) of rejection.

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#### Conclusion

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Twyler Lamb whose telephone number is 703 - 308-8823. The examiner can normally be reached on M-TH (8:30-5:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edward L Coles can be reached on 703-308-4712. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9306 for regular communications and 703-872-9314 for After Final communications.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks Washington, DC 20231

or faxed to:

(703) 872-9314

(for informal or draft communications, such as proposed amendments to be discussed at an interview; please label such communications "PROPOSED" or "DRAFT")

or hand-carried to:

Crystal Park Two

2121 Crystal Drive

Arlington. VA.

Sixth Floor (Receptionist)

Twyler Lamb

September 8, 2004